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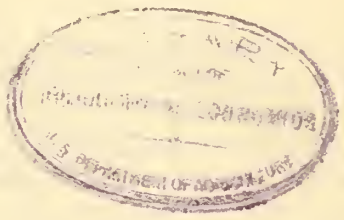
RELATIONSHIPS AMONG WATERMELON PRICES, FREIGHT RATES, PRODUCTION, AND MARKETINGS



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Prices received by growers for a number of years before the depression permitted an upward trend in the acreage and production of watermelons. Since then there has been a sharp reversal of conditions in the industry. Farm prices broke in 1930; in 1932 and again in 1933 there was a marked decline in production. The situation has prompted an analysis of the prices, production and marketing of watermelons. The results of the analysis follow. Because transportation costs are an unusually large factor in the marketing of this crop a discussion of freight rates is included.

Review of Prices and Production

Watermelon production in the United States increased sharply from a comparatively low level in 1923 to a peak in 1930. This expansion process increased production by nearly 40,000,000 melons, or from 42,734,000 to 82,380,000. One of the chief reasons watermelon production increased so sharply during the middle and late 1920's was that the incomes of urban consumers increased sharply during the same period. In these years prior to 1930 watermelon producers were able to market their entire crop at prices high enough to encourage further acreage expansion. In 1930 the situation changed. A record high production of watermelons coincided with a sharp decline in general business conditions and a sharp drop in consumer incomes in that year. As a result, a total of 5,677,000 melons were left unharvested in the fields.

With the exception of 1924, the average price received by growers for watermelons during the period 1923-30 was high enough to encourage growers to increase the watermelon acreage the next year. In 1930, prices were very low compared with those of earlier years and the acreage in 1931 was increased only slightly. In 1931 prices to growers declined still further and a total of 1,761,000 melons were left in the fields unharvested. The acreage was reduced about 3 percent in 1932. During 1931 and 1932 incomes of urban consumers continued to decline sharply. This loss of consumer buying power resulted not only in lower prices of watermelons but also in fewer purchases. Prices received by growers in 1932, averaging only $80 per car, were the lowest on record and a total of 8,663,000 melons were left unharvested. As a result of this situation, the watermelon acreage was reduced 20 percent, or by slightly more than 47,000 acres in 1933. This brought the total United States acreage down to about the same level as that planted in 1927 and with reduced yields, production declined to the lowest level since 1923.

Therefore, producers contracted their output in 2 years from a high level built up over a period of 6 years. In 1933, there was some recovery of business and consumer buying power which, with the smaller supply of watermelons available, resulted in somewhat higher prices. Although there were 1,354,000 melons left unharvested in 1933, the higher prices encouraged growers to the extent that the acreage in 1934 was increased by 10,000 acres or 5 percent. Yields per acre in 1934 were lower, however, and production did not equal the small crop of 1933. Prices to growers rose further and only a negligible quantity of melons were left unharvested. As a result of these improved conditions, the acreage planted in 1935 was increased about 13,000 acres or 7 percent. Yields, also, were higher than in the previous 3 years, and production increased by about 9,000,000 melons to 57,254,000. This increased supply resulted in lower prices and a total of 2,657,000 melons were left unharvested. Therefore, in 1936 the acreage was reduced about 8 percent.

Demand Reduced By Depression

If a marketed crop brings lower prices than prices received previously for a larger crop, it may be inferred that the demand for the product has declined. The decline in the urban demand for watermelons may, therefore, be indicated by comparing the prices received during depression years with those received for larger marketed crops in years of relatively greater prosperity. The harvested crop of 1930 was the largest in the period here reviewed, so no such comparisons are possible for that year. The harvested crop of 1931 was exceeded only by that of 1930. Although the crop was smaller in 1931 than in 1930, it was accompanied by a lower average New York price, as might be expected from the greater depth of the depression in 1931. The harvested crop of 1932 was smaller than any predepression crop, but was accompanied by a wholesale price per car at New York of only $231, while the price in predepression years ranged from $255 to $332. The crop of 1933 was also smaller than any of the predepression crops, but was accompanied by a New York price of only $240. The 1934 crop was accompanied by a New York price of $276, the same as in 1928; but harvested production in 1934 was only 48,054,000 melons, whereas harvested production in 1928 was 64,088,000 melons. In all other predepression years except 1926, in which a crop of 69,698,000 melons was harvested, the price was higher than in 1934, although production was greater. The 1935 crop brought a price, measured at New York, which was below that of all predepression years except 1926, although production was below these years. The 1935 crop of 55,209,000 melons was accompanied by a price at New York only $4 in excess of that which accompanied the 1926 crop, which was larger than that of 1935 by 14,000,000 melons.

Industrial Activity and Prices Obtainable for Various Quantities of Melons

A study of variations in watermelon prices and production from 1924 to 1936, inclusive indicates that variations in prices are chiefly affected by changes in production and incomes of urban consumers, and that changes in production are largely the result of past prices which affect acreage changes.

A graphic analysis of these relationships among watermelon prices, the production of watermelons, and industrial production is given in table 1, and figure 1. In this case the New York City average wholesale price is taken to represent the larger city markets. It is computed by taking the simple averages of daily prices for the months of June, July, and August and weighting them by monthly unloads. The production series is the United States harvested crop as estimated by the Crop Reporting Board of the United States Department of Agriculture. The Federal Reserve Board's "Index of Industrial Production" is taken as an approximate measure of changes in the buying power of watermelon consumers. A simple average of the monthly index numbers of industrial production was computed for the 12-month period September through August, on the assumption that purchasing power during the 9 months preceding the watermelon marketing season, as well as during the 3 months constituting the actual marketing season, influences the demand for watermelons.

It is indicated that a variation in harvested production from about 48,000,000 to 77,000,000 watermelons, was associated with variation in average prices ranging from about $340 to about $240. This variation in price with changes in production is measured under average conditions of consumer buying power for the period included in the analysis. It is evident, however, that consumer buying power, as measured by the index of industrial production, also fluctuated from year to year. It advanced from 95 percent of the 1923-25 average in 1924 to 119 percent in 1929 and then declined to 67 percent in 1932. The variation from 119 percent in 1929 to 67 percent in 1932 was associated with a decline in watermelon prices of $175 per car of 1,000 melons, after allowing for the influence of changes in watermelon production.

A review of this analysis indicates that, on the average, practically all of the variation in watermelon prices is associated with variation in the two factors, production of watermelons and a rough measure of consumer buying power. Exceptions of a minor character occur in 1925, 1926, and 1928.

Adjustment of Production to Prices Obtainable

Since production affects prices, it becomes necessary to determine the factors affecting production. These factors influence both annual yield variation and acreage variation.

The average number of melons produced per acre during the last 15 years has been as follows:

Year	Melons	Year	Melons	Year	Melons
1921	397	1926	350	1931	311
1922	337	1927	316	1932	261
1923	272	1928	310	1933	269
1924	309	1929	323	1934	250
1925	325	1930	350	1935	281

It may be seen that the yield has varied from 250 to 397 melons per acre. These variations are largely due to variations in weather conditions, prevalence of diseases and insect pests, etc. On the whole, yields have been materially lower since 1931. It is possible that there may have been a decline in the care and intensity of cultivation during recent years.

Annual variations in acreage are largely due to the responses of producers to changes in profits. It appears that during the period 1921 to 1930 inclusive (table 2 and figure 2) watermelon growers increased their acreage when the price to them the previous year was above $168 per 1,000 melons. They decreased the acreage when the price received the previous year was below this figure.

For the period 1931-36 it may be observed that growers were willing to increase their planted acreage of watermelons when the price the previous year was much lower than during the period 1923-30. In 1930 the average price received by growers was only $116 per 1,000 melons, yet the acreage was slightly increased in 1931. In 1931 the price declined to $102 and the acreage was reduced by only 7,390 acres. One explanation for the small reductions in these 2 years is that growers had made good profits through 1929 and they were reluctant to reduce their output of a crop that had been making good returns. In 1932 prices declined to $80 per car and the acreage in 1933 declined 47,280 acres. This sharp acreage decline in 1 year indicates that the acreage adjustment that might have been expected in 1931, 1932, and 1933 was made almost entirely in the last year. Prices were higher in 1933 and 1934 and an upward adjustment was made in the acreage in 1934 and 1935. Costs evidently rose in 1935 to such an extent that $97 per 1,000 melons was not as profitable as $96 was in 1933. The acreage in 1936 was decreased by 15,810 acres. Owing to the slightly smaller crop and to improving consumer buying power in 1936, prices were considerably higher than in the last 5 or 6 years. On the basis of past experience, it is likely that these higher prices will cause growers to increase the watermelon acreage substantially in 1937 and that the prices received from the expanded production will determine how long and to what extent the increase in acreage will be retained.

Reduced Marketing Costs Would Permit Higher Production at Prices Acceptable to Farmers

If costs of marketing watermelons could be reduced, the lower urban demand for them would be offset in some degree as far as the effect on farm prices and hence on the acreage which growers are willing to plant is concerned.

Freight rates are an important element in the cost of marketing watermelons.

Rates as an Element of Marketing Costs

The decline in the demand for watermelons in metropolitan markets after 1929 was not accompanied by proportionate reductions in freight rates. The average price of watermelons at metropolitan markets, minus freight, has declined by a greater percentage than the price at these markets before deduction of freight. In other words, the amount available to cover the expenses of production and marketing, other than freight, which must be incurred to place watermelons in the wholesale city markets has declined more than the market price.

The average wholesale price per car at New York, the freight from Moultrie, Georgia, and the average price minus the freight are shown in table 3. The price, and the price minus freight, are also expressed as percentages of their 1925-29 averages. These percentages are shown graphically in figure 3. It may be seen from the chart that the amount available to cover other expenses has been reduced by a greater percentage during the depression than the market price. In 1935 the net proceeds were 39 percent below prosperity, although the market price was only 14 percent lower. Similar data are presented for the New York price in connection with the freight from Newberry, Florida, and Fairfax, North Carolina, and for the Chicago price in connection with all three rates, in tables 4 to 8. Study of these tables will indicate that a chart of the corresponding percentages would look very similar to the chart for New York and Moultrie.

From a consideration of these data it might be expected that farm prices would decline more than city prices during the depression. This has, in fact, occurred. In figure 4, the New York wholesale price, the Chicago wholesale price, and the United States average farm price are expressed as percentages of their 1925-29 averages and are compared. (The data for this chart will be found in the tables just cited and in table 9). The United States average farm price has declined by a greater percentage than the price at the two most important markets. In 1935 the farm price was 47 percent lower than in prosperity although the New York price was only 14 percent lower.

Another way of putting this is that freight rates have become much greater in comparison with farm prices. In tables 10, 11, and 12, the State average farm prices in each of the three most important Southern watermelon States are compared with the freight rate to New York from an important shipping point in each State. The percentage ratios of these freight rates to these farm prices are shown graphically in figure 5. It will be seen that the ratio of freight rates to farm prices has increased. Similar data, based on the freight rates to Chicago, appear in the tables. A chart showing the ratio of these rates to farm prices would look very similar to the chart for New York.

Even before the depression, freight rates per unit on watermelons were greater in proportion to their value per unit than in the case of most other farm and non-farm products. It is interesting to compare the acreage and production of watermelons during the depression with that of other crops in the case of which the freight rates are not so important an element of marketing expense. Such a comparison is here presented for six other farm products - cabbage, potatoes, cantaloups and other melons, onions, tomatoes, and berries.

These products are like watermelons in that they are all marketed fresh, so that processing costs are not an element. (Some cabbage, tomatoes, and berries are processed, but the data refer only to the crops grown for market.) They are also like watermelons in that they are replanted annually. Growers of all these crops are likely to respond more quickly and fully to changes in prices and other economic conditions by altering their production than are growers of orchard crops, such as peaches, who have a large fixed investment.

In each of tables 13 to 19, the aggregate tonnage of one of these products originated by the railroads is shown. The average farm value of this tonnage is roughly approximated by multiplying the tonnage by the United States average farm price. The aggregate freight revenue collected by the railroads for the transportation of the product is shown, and its percentage ratio to the value of the tonnage. This ratio is equivalent to the percentage ratio of the average freight charge to the average farm price. These ratios are shown graphically in figure 6. It will be seen that freight rates were higher relatively to farm prices on watermelons than on the 6 other crops before the depression, and that the disparity has increased. The acreage of these crops is shown in table 20 to 26, and the acreage of each is expressed as a percentage of its 1928-29 average. The acreage of each crop is compared with that of watermelons, both on a 1928-29 base, in figure 7. On the whole the trend of watermelon acreage has been downward relatively to that of the other crops.

Similar data are shown for production in the same tables. Where quantities of the crop were reported as not harvested because of low prices, separate figures are shown for total production and harvested production. Production is also shown in terms of percentages of the 1928-29 average. The percentages for harvested production are shown graphically in figure 8. On the whole watermelon production has declined relative to that of the other crops.

Increased Use of Other Than Railroad Transportation

To some extent shippers of watermelons have apparently turned away from railroad transportation to other means of transport. In table 27, the tonnage of watermelons originated by the railroads is expressed as a percentage of total production and of harvested production. These percentages are shown graphically in figure 9. It will be seen that the railroad traffic has declined from 62 percent of total production in 1928 to 41 percent in 1935. Part of this decline is accounted for in some years by unharvested production. The rest is presumably largely accounted for by diversion to other means of transport. Similar data for the South alone are shown in table 28 and figure 9.

Watermelon Rates High in Relation to Value

Among factors considered in making railroad freight rates is the comparative value of different commodities transported by railroad. Other things being equal, it is recognized that commodities of high value per 100 pounds should bear higher rates than those of lower value. But if commodities that have a heavy average loading per car are compared with commodities that have a light loading, value comparisons are of little significance. For it is also recognized that a commodity that has a materially heavy loading may properly take lower freight rates even if it also has higher value. In 1934 the average loading of watermelons was 13.16 tons per car. The average loading for 30 other commodities classified as products of agriculture or animals and products by the Interstate Commerce Commission was 15 tons or less. On some of these, such as eggs, the rates are believed to be rather high already relative to those on watermelons. For others, because they are imported, or are manufactures of farm products, or are too heterogenous, or for other reasons, no farm value figures are available. The farm value per 100 pounds (net weight) of the others, and of watermelons, is shown in tables 29 to 34 - one table for each Southern watermelon-growing State. The values for Georgia are compared in figure 10. In Georgia the value of watermelons has been less than the values of any of the other farm products, even hay, in every year from 1928 through 1935.

Table 1.- New York wholesale price of watermelons related to harvested production of watermelons and to industrial production, 1924-36

Year	Production 1/		Harvested	Wholesale price 2/	Industrial production 1923-25 = 100 3/
	Total	Unharvested			Sept. - Aug. av.
	1,000 melons	1,000 melons	1,000 melons	Dollars per car	
1924	57,086		57,086	292	94.8
1925	56,498		56,498	332	100.9
1926	69,698		69,698	255	106.4
1927	57,602		57,602	324	108.3
1928	64,088		64,088	276	106.3
1929	69,997		69,997	318	119.2
1930	82,380	5,677	76,703	257	104.6
1931	73,905	1,761	72,144	243	95.2
1932	59,897	8,663	51,234	231	67.0
1933	49,188	1,354	47,834	240	72.4
1934	48,176	122	48,054	276	79.7
1935	57,866	2,657	55,209	259	83.7
1936	55,440				98.6

1/ United States Crop Reporting Board.
2/ Price to jobbers, average of prices at New York for months of June, July and August, weighted by carloads. Monthly prices, straight averages of daily quotations.
3/ Federal Reserve Board, Index of Industrial Production: straight average of 12 monthly index numbers, September of preceding year to August of year shown.

Table 2.- Watermelons: Acreage changes and average price received by growers the previous year, 1920-36

Year	Acreage	Acreage changes	Average price received the previous year per 1,000 melons
	Acres	Acres	Dollars
1920	149,286		
1921	155,660	+ 6,374	185
1922	211,060	+ 55,400	191
1923	157,350	- 53,710	155
1924	184,830	+ 27,480	249
1925	173,710	- 11,120	160
1926	199,060	+ 25,350	236
1927	182,110	- 16,950	146
1928	206,410	+ 24,300	186
1929	216,490	+ 10,080	172
1930	235,390	+ 18,900	173
1931	237,320	+ 1,930	116
1932	229,930	- 7,390	102
1933	182,650	- 47,280	80
1934	192,340	9,690	96
1935	205,660	13,320	108
1936	189,850	15,810	97

Data from United States Crop Reporting Board.

Table 3.- Price of watermelons at New York, price less freight rate from Moultrie, Georgia, and relative changes, average 1925-29, annual 1925-35

Year	Average price at New York 1/		Freight rate from Moultrie to New York		Average price less freight rate	
	Per car	Percentage of 1925-1929	Per 100 pounds 2/	Per car 3/	Per car	Percentage of 1925-1929
	Dollars	Percent	Cents	Dollars	Dollars	Percent
Average 1925-1929	301	100	---	---	120	100
1925	332	110	67	181	151	126
1926	255	85	67	181	74	62
1927	324	108	67	181	143	119
1928	276	92	67	181	95	79
1929	318	106	67	181	137	114
1930	257	85	67	181	76	63
1931	243	81	67	181	62	52
1932	231	77	67	181	50	42
1933	243	81	69	186	57	48
1934	276	92	69	186	90	75
1935	259	86	69	186	73	61

1/ Price to jobbers. Average of prices for months of June, July and August, weighted by unloads. Monthly prices straight averages of daily quotations.

2/ Agent Glenn's tariff Interstate Commerce Commission No. A - 414 through 1932; Agent Curlett's Interstate Commerce Commission No. 358 thereafter. Rates shown for 1933 effective March 22, before beginning of marketing season.

3/ Preceding column multiplied by 270, assumed number of hundredweight per car.

Table 4.-Price of watermelons at New York, price less freight rate from Newberry, Florida, and relative changes, average 1925-29, annual 1925-35

Year	Average price at N.Y. 1/		Freight rate from Newberry to N.Y.		Average price less freight rate	
	Per car	Percentage of 1925-29	Per 100 pounds 2/	Per car 3/	Per car	Percentage of 1925-29
	Dollars	Percent	Cents	Dollars	Dollars	Percent
Average 1925-29	301	100	---	---	108	100
1925	332	110	72	194	138	128
1926	255	85	72	194	61	57
1927	324	108	72	194	130	121
1928	276	92	72	194	82	76
1929	318	106	4/ 71	191	127	118
1930	257	85	5/ 71	191	66	61
1931	243	81	71	191	52	48
1932	231	77	71	191	40	37
1933	243	81	72	194	49	46
1934	276	92	72	194	82	76
1935	259	86	72	194	65	60

1/ Price to jobbers. Average of prices for months of June, July, and August weighted by unloads. Monthly prices straight average of daily quotations.

2/ Agent Glenn's tariff Interstate Commerce Commission No. A - 414 through 1932; Agent Curlett's Interstate Commerce Commission No. 358 thereafter. Rates shown for 1933 effective March 22, before beginning of marketing season.

3/ Preceding column multiplied by 270, assumed number of hundredweight per car.

4/ Effective February 28, 1929, before beginning of shipping season.

5/ Restored to 72 cents effective August 11, 1930. This minor change, coming late in the season, is ignored in this table. The 70.7 cents rate was restored effective February 26, 1931.

Table 5.- Price of watermelons at New York, price less freight rate from Fairfax, South Carolina, and relative changes, average 1925 - 1929, annual 1925-35

Year	Average price at New York 1/		Freight rate from Fairfax to New York		Average price less freight rate	
	Per car	Percentage of 1925-29	Per 100 pounds 2/	Per car 3/	Per car	Percentage of 1925-29
	Dollars	Percent	Cents	Dollars	Dollars	Percent
Average 1925-29	301	100	---	---	159	100
1925	332	110	52	142	190	119
1926	255	85	52	142	113	71
1927	324	108	52	142	182	114
1928	276	92	52	142	134	84
1929	318	106	52	142	176	111
1930	257	85	52	142	115	72
1931	243	81	52	142	101	64
1932	231	77	52	142	89	56
1933	243	81	57	154	89	56
1934	276	92	57	154	122	77
1935	259	86	57	154	105	66

1/ Price to jobbers. Average of prices for months of June, July, and August, weighted by unloads. Monthly prices straight average of daily quotations.

2/ Agent Glenn's tariff I.C.C. No. A - 414 through 1932; Agent Curlett's I.C.C. No. 358 thereafter. Rates shown for 1933 effective March 22, before beginning of marketing season.

3/ Preceding column multiplied by 270, assumed numberof hundredweight per car.

Table 6.- Price of watermelons at Chicago, price less freight rate from Moultrie, Georgia, and relative changes, average 1925 - 1929, annual 1925-35

Year	Average price at Chicago 1/		Freight rate from Moultrie to Chicago		Average price less freight rate	
	Per car	Percentage of 1925-29	Per 100 pounds 2/	Per car 3/	Per car	Percentage of 1925-29
	Dollars	Percent	Cents	Dollars	Dollars	Percent
Average 1925-29	331	100	---	---	158	100
1925	359	108	64	173	186	118
1926	292	88	64	173	119	75
1927	354	107	64	173	181	115
1928	312	94	64	173	139	88
1929	338	102	64	173	165	104
1930	296	89	64	173	123	78
1931	267	81	64	173	94	59
1932	253	76	64	173	80	51
1933	269	81	67	181	88	56
1934	281	85	67	181	100	63
1935	279	84	67	181	98	62

1/ Price to jobbers. Average of prices for months of June, July, and August, weighted by unloads. Monthly prices straight averages of daily quotations.

2/ Agent Glenn's tariff I.C.C. No. A - 414 through 1932; Agent Galligan's tariffs I.C.C. Nos. 208 and 304 thereafter. Rates shown for 1933 effective March 22, before beginning of marketing season.

3/ Preceding column multiplied by 270, assumed number of hundredweight per car.

Table 7.- Price of watermelons at Chicago, price less freight rate from Newberry, Florida, and relative changes, average 1925-29, annual 1925-35

Year	Average price at Chicago 1/		Freight rate from Newberry to Chicago		Average price less freight rate	
	Per car	Percentage of 1925-29	Per 100 pounds 2/	Per car 3/	Per car	Percentage of 1925-29
	Dollars	Percent	Cents	Dollars	Dollars	Percent
Average 1925-29	331	100	---	---	133	100
1925	359	108	74	198	161	121
1926	292	88	74	198	94	71
1927	354	107	74	198	156	117
1928	312	94	74	198	114	86
1929	338	102	74	198	140	105
1930	296	89	74	198	98	74
1931	267	81	74	198	69	52
1932	253	76	74	198	55	41
1933	269	81	74	200	69	52
1934	281	85	74	200	81	61
1935	279	84	74	200	79	59

1/ Price to jobbers. Average of prices for months of June, July, and August, weighted by unloads. Monthly prices straight averages of daily quotations.

2/ Agent (Glenn's tariff Interstate Commerce Commission No. A - 414 through 1932; Agent Galligan's tariffs Interstate Commerce Commission Nos. 208 and 304 thereafter. Rates shown for 1933 effective March 22, before beginning of marketing season.

3/ Preceding column multiplied by 270, assumed number of hundredweight per car.

Table 8.- Price of watermelons at Chicago, price less freight rate from Fairfax, South Carolina, and relative changes, average 1925-39, annual 1925-35

Year	Average price at Chicago 1/		Freight rates from Fairfax to Chicago		Average price less freight rate	
	Per car	Percentage of 1925-29	Per 100 pounds 2/	Per car 3/	Per car	Percentage of 1925-29
	Dollars	Percent	Cents	Dollars	Dollars	Percent
Average 1925-29	331	100	---	---	147	100
1925	359	108	68	184	175	119
1926	292	88	68	184	108	73
1927	354	107	68	184	170	116
1928	312	94	68	184	128	87
1929	338	102	68	184	154	105
1930	296	89	68	184	112	76
1931	267	81	68	184	83	56
1932	253	76	68	184	69	47
1933	269	81	65	176	93	63
1934	281	85	65	176	105	71
1935	279	84	65	176	103	70

1/ Price to jobbers. Average of prices for months of June, July, and August, weighted by unloads. Monthly prices straight averages of daily quotations.

2/ Agent Glenn's tariff Interstate Commerce Commission No. A-414 through 1932; Agent Galligan's tariffs Interstate Commerce Commission Nos. 208 and 304 thereafter. Rates shown for 1933 effective March 22, before beginning of marketing season.

3/ Preceding column multiplied by 270, assumed number of hundredweight per car.

Table 9.-United States farm price of watermelons and relative changes, average 1925-29, annual 1925-35

Year	United States farm price		Year	United States farm price	
	Per 1,000 melons	Percentage of 1925-29		Per 1,000 melons	Percentage of 1925-29
	Dollars	Percent		Dollars	Percent
Average 1925-29	183	100	1930	116	63
1925	236	129	1931	102	56
1926	146	80	1932	80	44
1927	186	102	1933	96	52
1928	172	94	1934	108	59
1929	173	95	1935	97	53

Table 10.-Watermelons: Ratio of freight rates from Moultrie, Georgia, to Georgia farm price, 1925-35

Year	Seasonal average State farm price	Freight rate from Moultrie to New York 1/		Freight rate from Moultrie to Chicago 1/	
	Per 1,000 melons	Per car	Percentage of farm price	Per car	Percentage of farm price
	Dollars	Dollars	Percent	Dollars	Percent
1925	244	181	74	173	71
1926	121	181	150	173	143
1927	161	181	112	173	107
1928	141	181	128	173	123
1929	150	181	121	173	115
1930	70	181	259	173	247
1931	65	181	278	173	266
1932	50	181	362	173	346
1933	72	186	258	181	251
1934	82	186	227	181	221
1935	50	186	372	181	362

1/ For derivation and tariff authorities, see tables 3 and 6.

Table 11.- Watermelons: Ratio of freight rates from Newberry, Florida, to Florida farm price, 1925-35

Year	Seasonal average state farm price	Freight rate from Newberry to New York 1/		Freight rate from Newberry to Chicago 1/	
	Per 1,000 melons	Per car	Percentage of farm price	Per car	Percentage of farm price
	Dollars	Dollars	Percent	Dollars	Percent
1925	408	194	48	198	49
1926	255	194	76	198	78
1927	286	194	68	198	69
1928	299	194	65	198	66
1929	278	191	69	198	71
1930	250	191	76	198	79
1931	200	191	95	198	99
1932	160	191	119	198	124
1933	200	194	97	200	100
1934	185	194	105	200	103
1935	110	194	176	200	182

1/ For derivation and tariff authorities, see tables 4 and 7.

Table 12.- Watermelons: Ratio of freight rates from Fairfax, South Carolina, to South Carolina farm price, 1925-35

Year	Seasonal average state farm price: Per 1,000 melons	Freight rate from Fairfax to New York 1/: Per car	Freight rate from Fairfax to New York 1/: Percentage of farm price	Freight rate from Fairfax to Chicago 1/: Per car	Freight rate from Fairfax to Chicago 1/: Percentage of farm price
	Dollars	Dollars	Percent	Dollars	Percent
1925	166	142	85	184	111
1926	88	142	161	184	209
1927	168	142	85	184	110
1928	94	142	151	184	196
1929	175	142	81	184	105
1930	50	142	284	184	368
1931	98	142	145	184	188
1932	60	142	237	184	307
1933	50	154	308	176	352
1934	120	154	128	176	147
1935	92	154	167	176	191

1/ For derivation and tariff authorities, see tables 5 and 8.

Table 13.- Watermelons: Ratio of freight revenue to farm value, United States, 1928-35

Calendar year	Farm price 1/		Tonnage originated 3/	Farm value of tonnage originated 4/	Freight revenue 3/	Ratio of freight revenue to farm value
	Per 1,000 melons	Per ton 2/				
	Dollars	Dollars	Short tons	Dollars	Dollars	Percent
1928	172	12.74	540,482	6,885,741	6,666,412	97
1929	173	12.81	570,485	7,307,913	7,480,138	102
1930	116	8.59	637,967	5,480,137	8,053,211	147
1931	102	7.56	567,819	4,292,712	7,249,683	169
1932	80	5.93	336,902	1,997,829	4,533,349	227
1933	96	7.11	314,151	2,233,614	4,432,003	198
1934	108	8.00	288,224	2,305,792	3,975,336	172
1935	97	7.19	323,413	2,325,339	4,857,763	209

1/ Average price received by growers for the crop marketing season.
2/ Preceding column divided by 13.5 tons, assumed shipping weight of 1,000 melons.
3/ Interstate Commerce Commission: Freight commodity statistics.
4/ Product of preceding two columns.

Table 14.- Cabbage: Ratio of freight revenue to farm value, United States, 1928-35

Year beginning July 1	Average farm price per ton 1/	Tonnage originated 2/	Farm value of tonnage originated 3/	Freight revenue 2/	Ratio of freight revenue to farm value
	Dollars	Short tons	Dollars	Dollars	Percent
1928	23.59	526,610	12,422,730	7,392,661	60
1929	19.94	476,121	9,493,853	5,998,288	63
1930	22.16	524,933	11,632,515	7,092,453	61
1931	11.12	399,390	4,441,217	5,413,992	122
1932	13.00	351,514	4,569,682	4,520,237	99
1933	18.37	371,221	6,819,330	5,756,401	84
1934	9.13	386,290	3,526,828	4,461,540	126
1935	14.67	4/220,814	3,239,341	4/2,837,214	88

1/ Average price received by growers of cabbage for market for crop marketing season, except that late Danish part of crop is included in average on basis of prices received to December 1.

2/ Interstate Commerce Commission: Freight commodity statistics (quarterly).

3/ Product of preceding two columns.

4/ First 9 months.

Table 15.-Potatoes: Ratio of freight revenue to farm value, United States, 1928-35

Year beginning July 1	Farm price 1/		Tonnage originated 3/	Farm value of tonnage originated 4/	Freight revenue 3/	Ratio of freight revenue to farm value
	Per bushel	Per ton 2/				
	Cents	Dollars	Short tons	Dollars	Dollars	Percent
1928	57.1	19.03	4,361,385	82,997,157	42,080,669	51
1929	131.8	43.93	4,423,387	194,319,391	46,246,513	24
1930	91.9	30.63	4,439,285	135,975,300	48,782,326	36
1931	46.3	15.43	3,925,272	60,566,947	37,523,232	62
1932	39.3	13.10	3,239,154	42,432,917	30,493,682	72
1933	82.3	27.43	3,667,803	100,607,836	39,138,783	39
1934	45.4	15.13	3,630,682	54,932,219	34,399,228	63
1935	58.5	19.50	5/2,422,436	47,237,5025/	24,140,114	51

1/ Average price received by growers for the crop marketing season.
2/ Preceding column multiplied by 33.33 (number of bushels per ton).
3/ Interstate Commerce Commission: Freight commodity statistics (quarterly).
4/ Product of two preceding columns.
5/ First 9 months.

Table 16.-Cantaloups and melons (other than watermelons): Ratio of freight revenue to farm value, United States, 1928-35

Calendar year	Farm price 1/		Tonnage originated 3/	Farm value of tonnage originated 4/	Freight revenue 3/	Ratio of freight revenue to farm value
	Per crate (60 lbs.)	Per ton 2/				
	Dollars	Dollars	Short tons	Dollars	Dollars	Percent
1928	1.30	43.33	414,349	17,953,742	12,676,246	71
1929	1.31	43.66	430,583	18,799,254	13,101,306	70
1930	1.21	40.33	392,246	15,819,281	12,032,892	76
1931	1.00	33.33	389,824	12,992,834	11,986,050	92
1932	.83	27.66	282,043	7,801,309	8,622,890	110
1933	.79	26.33	206,914	5,448,046	6,100,399	112
1934	1.10	36.66	202,476	7,422,770	6,409,962	86
1935	.92	30.66	211,001	6,469,291	6,434,865	99

1/ Average price received by growers for the crop marketing season.
2/ Preceding column multiplied by 33.33, number of crates per 2,000 pounds.
3/ Interstate Commerce Commission: Freight commodity statistics.
4/ Product of preceding two columns.

Table 17.-Onions: Ratio of freight revenue to farm value, United States, 1928-35

Year beginning July 1	Average farm price 1/: Per 100 pounds	Per ton 2/	Tonnage originated 3/	Farm value of tonnage originated 4/	Freight revenue 3/	Ratio of freight revenue to farm value
	Dollars	Dollars	Short tons	Dollars	Dollars	Percent
1928	2.16	43.20	512,531	22,141,339	6,957,356	31
1929	1.34	26.80	538,625	14,435,150	6,737,764	47
1930	.92	18.40	534,478	9,834,395	6,026,655	61
1931	1.42	28.40	425,886	12,095,162	5,397,614	45
1932	.70	14.00	390,237	5,463,318	4,169,488	76
1933	1.09	21.80	395,593	8,623,927	4,863,305	56
1934	1.13	22.60	411,925	9,309,505	5,011,231	54
1935	1.29	25.80	5/ 309,940	7,996,452	5/3,491,076	44

1/ Average price received by growers for crop marketing season, except that late States part of crop is included in average on basis of prices received to December 1.
2/ Preceding column multiplied by 20.
3/ Interstate Commerce Commission: Freight commodity statistics (quarterly).
4/ Product of preceding two columns.
5/ First 9 months.

Table 18.-Tomatoes: Ratio of freight revenue to farm value, United States, 1928-35

Calendar year	Farm price 1/: Per bushel (53 lbs.)	Per ton 2/	Tonnage originated 3/	Farm value of tonnage originated 4/	Freight revenue 3/	Ratio of freight revenue to farm value
	Dollars	Dollars	Short tons	Dollars	Dollars	Percent
1928	1.81	68.31	349,438	23,870,110	8,067,713	34
1929	1.82	68.69	364,732	25,053,441	8,164,990	33
1930	1.61	60.76	376,386	22,869,213	8,772,049	38
1931	1.10	41.51	281,985	11,705,197	7,200,279	62
1932	1.03	38.87	245,192	9,530,613	6,891,613	72
1933	1.14	43.02	238,854	10,275,499	6,160,720	60
1934	1.28	48.31	271,644	13,123,122	6,702,388	51
1935	1.19	44.91	250,247	11,238,593	6,288,507	56

1/ Average price received by growers for crop marketing season.
2/ Preceding column multiplied by 37.74, number of bushels per 2,000 pounds.
3/ Interstate Commerce Commission: Freight commodity statistics.
4/ Product of preceding two columns.

Table 19.- Berries: Ratio of freight revenue to farm value, United States, 1928-35

Calendar year	Farm price 1/: Per crate (36 lbs)	Farm price 1/: Per ton 2/	Tonnage originated 3/	Farm value of tonnage originated 4/	Freight revenue 3/	Ratio of freight revenue of farm value
	Dollars	Dollars	Short tons	Dollars	Dollars	Percent
1928	3.28	182.24	100,072	18,237,121	2,760,325	15
1929	3.21	178.35	91,548	16,327,586	2,603,984	16
1930	4.01	222.80	39,509	8,802,605	1,052,405	12
1931	3.27	181.68	52,644	9,564,362	1,669,707	17
1932	1.90	105.56	45,689	4,822,931	1,270,667	26
1933	1.70	94.45	51,705	4,883,537	1,290,280	26
1934	1.94	107.79	48,913	5,272,332	1,163,746	22
1935	2.35	130.57	36,388	4,751,181	843,002	18

1/ Strawberries only. Average price received by growers for crop marketing season.
2/ Preceding column multiplied by 55.56, number of crates per 2,000 pounds.
3/ Interstate Commerce Commission: Freight commodity statistics.
4/ Product of preceding two columns.

Table 20.- Watermelons: Acreage and production in the United States, average 1928-29, annual 1925-35

Year	Acreage: Quantity	Acreage: Percentage of 1928-29	Production, total: Quantity	Production, total: Percentage of 1928-29	Production, harvested 1/: Quantity	Production, harvested 1/: Percentage of 1928-29
	Acres	Percent	1,000 melons	Percent	1,000 melons	Percent
Average 1928-29	211,450	100	67,042	100	67,042	100
1925	173,710	82.2	56,498	84.3		84.3
1926	199,060	94.1	69,698	104.0		104.0
1927	182,110	86.1	57,602	85.9		85.9
1928	206,410	97.6	64,088	95.6	64,088	95.6
1929	216,490	102.4	69,997	104.4	69,997	104.4
1930	235,390	111.3	82,380	122.9	76,703	114.4
1931	237,320	112.2	73,905	110.2	72,144	107.6
1932	229,930	108.7	59,897	89.3	51,234	76.4
1933	182,650	86.4	49,188	73.4	47,834	71.3
1934	192,340	91.0	48,176	71.9	48,054	71.7
1935	204,410	96.7	57,254	85.4	54,597	81.4

1/Total production less quantities not harvested on account of market conditions

Table 21.- Potatoes: Acreage and production in the United States, average 1928-29, annual 1925-35.

Year	Acreage		Production	
	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29
	1,000 acres	Percent	1,000 bushels	Percent
Average 1928-29	3,259	100	379,726	100
1925	2,809.8	86.2	296,466	78.1
1926	2,810.8	86.2	321,607	84.7
1927	3,181.8	97.6	369,644	97.3
1928	3,499	107.4	427,249	112.5
1929	3,018.7	92.6	332,204	87.5
1930	3,102.9	95.2	340,572	89.7
1931	3,466.6	106.4	384,125	101.2
1932	3,549.3	108.9	376,425	99.1
1933	3,411.5	104.7	342,306	90.1
1934	3,597	110.4	406,105	106.9
1935	3,551.1	109.0	387,678	102.1

Table 2.- Cabbage for market: Acreage and production in the United States, average 1928-29, annual 1925-35

Year	Acreage		Production, total		Production, harvested 1/	
	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29
	Acres	Percent	Tons	Percent	Tons	Percent
Average 1928-29	119,210	100	851,700	100	851,700	100
1925	111,460	93.5	861,200	101.1		101.1
1926	118,790	99.6	938,700	110.2		110.2
1927	129,740	108.8	1,058,100	124.2		124.2
1928	111,730	93.7	807,200	94.8	807,200	94.8
1929	126,690	106.3	896,200	105.2	896,200	105.2
1930	123,760	103.8	804,200	94.4	804,200	94.4
1931	131,150	110.0	880,700	103.4	809,800	95.1
1932	124,150	104.1	835,200	98.1	810,900	95.2
1933	108,930	91.4	632,300	74.2	625,800	73.5
1934	151,020	126.7	1,014,700	119.1	900,400	105.7
1935	121,810	102.2	791,600	92.9	779,900	91.6
1936	137,350	115.2				

1/ Total production less quantities not harvested on account of market conditions.

Table 23.-Cantaloups and other melons: Acreage and production in the United States, average 1928-29, annual 1925-35

Year	Acreage		Production, total		Production, harvested 1/	
	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29
	Acres	Percent	1,000 crates	Percent	1,000 crates	Percent
Average 1928-29	105,755	100	16,566	100	16,566	100
1925	93,260	88.2	14,553	87.8		87.8
1926	101,690	96.2	14,393	86.9		86.9
1927	105,740	100.0	15,014	90.6		90.6
1928	102,840	97.2	15,890	95.9	15,890	95.9
1929	108,670	102.8	17,242	104.1	17,242	104.1
1930	129,010	122.0	15,761	95.1	15,761	95.1
1931	138,310	130.8	17,745	107.1	17,312	104.5
1932	135,780	128.4	16,931	102.2	13,829	83.5
1933	109,050	103.1	12,916	78.0	12,053	72.8
1934	96,500	91.2	12,087	73.0	12,087	73.0
1935	112,640	106.5	13,366	80.7	12,972	78.3

1/ Total production less quantities not harvested on account of market conditions.

Table 24.-Onions: Acreage and production in the United States, average 1928-29, annual 1925-35

Year	Acreage		Production, total		Production, harvested 1/	
	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29
	Acres	Percent	1,000 sacks	Percent	1,000 sacks	Percent
Average 1928-29	84,080	100	12,673	100	12,588	100
1925	64,450	76.7	10,943	86.3		86.9
1926	75,770	90.1	12,136	95.8		96.4
1927	77,610	92.3	13,340	105.3		106.0
1928	80,820	96.1	11,353	89.6	11,265	89.5
1929	87,340	103.9	13,993	110.4	13,910	110.5
1930	83,810	99.7	14,710	116.1	14,667	116.5
1931	78,430	93.3	10,649	84.0	10,286	81.7
1932	91,750	109.1	15,530	122.5	14,928	118.6
1933	80,670	95.9	12,171	96.0	12,171	96.7
1934	84,820	100.9	13,007	102.6	12,821	101.9
1935	101,230	120.4	14,546	114.8	14,024	111.4

1/ Total production less quantities not harvested on account of market conditions.

Table 25.- Tomatoes, for market: Acreage and production in the United States average 1928-29, annual 1925-35

Year	Acreage		Production, total		Production, harvested 1/	
	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29
	Acres	Percent	1,000 bushels	Percent	1,000 bushels	Percent
Average 1928-29	141,045	100	16,269	100	16,248	100
1925	134,020	95.0	19,568	120.3		120.4
1926	111,030	78.7	13,614	83.7		83.8
1927	138,900	98.5	17,434	107.2		107.3
1928	139,470	98.9	15,619	96.0	15,578	95.9
1929	142,620	101.1	16,919	104.0	16,919	104.1
1930	154,640	109.6	16,982	104.4	16,907	104.1
1931	158,970	112.7	16,931	104.1	16,763	103.2
1932	157,610	111.7	18,003	110.7	17,877	110.0
1933	154,430	109.5	16,133	99.2	15,999	98.5
1934	162,610	115.3	18,319	112.6	17,237	106.1
1935	170,630	121.0	19,176	117.9	19,176	118.0

1/ Total production less quantities not harvested on account of market conditions.

Table 26.- Strawberries: Acreage and production in the United States, average 1928-29, annual 1925-35

Year	Acreage		Production, total		Production, harvested 1/	
	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29	Quantity	Percentage of 1928-29
	Acres	Percent	1,000 crates	Percent	1,000 crates	Percent
Average 1928-29	198,655	100	13,359	100	13,240	100
1925	144,740	72.9	9,524	71.3		71.9
1926	152,040	76.5	11,496	86.1		86.8
1927	191,250	96.3	13,381	100.2		101.1
1928	202,360	101.9	13,370	100.1	13,300	100.5
1929	194,950	98.1	13,348	99.9	13,180	99.5
1930	171,910	86.5	9,275	69.4	9,275	70.1
1931	150,450	75.7	11,177	83.7	11,177	84.4
1932	188,300	94.8	13,323	99.7	12,831	96.9
1933	196,170	98.7	13,333	99.8	12,300	92.9
1934	197,660	99.5	13,152	98.5	12,198	92.1
1935	163,310	82.2	11,681	87.4	11,609	87.7

1/ Total production less quantities not harvested on account of market conditions.

Table 27.- Tonnage of watermelons originated, compared with production, United States, 1928-35

Calendar year	Production, total		Production harvested 1/			Tonnage originated by Class I railways		
	Quantity		Quantity		Percentage of total production	Quantity	Percentage of total production	Percentage of harvested production
	1,000 melons 2/	Short tons 3/	1,000 melons 2/	Short tons 3/	Percent	Short tons 4/	Percent	Percent
1928	64,088	865,188	64,088	865,188	100	540,482	62	62
1929	69,997	944,960	69,997	944,960	100	570,485	60	60
1930	82,380	1,112,130	76,703	1,035,490	93	637,967	57	62
1931	73,905	997,718	72,144	973,944	98	567,819	57	58
1932	59,897	808,610	51,234	691,659	86	336,902	42	49
1933	49,188	664,038	47,834	645,759	97	314,151	47	49
1934	48,176	650,376	43,054	648,729	5/100	288,224	44	44
1935	57,866	781,191	54,597	737,060	94	323,413	41	44

1/ Total production less quantities not harvested because of market conditions.
2/ Estimates of Crop Reporting Board, United States Department of Agriculture.
3/ Preceding column multiplied by 13.5 (assumed number of tons per 1,000 melons).
4/ Interstate Commerce Commission: Freight commodity statistics.
5/ More exactly, 99.7 percent.

Table 28.- Tonnage of watermelons originated, compared with production, Southern States, 1928-35

Calendar year	Production, total 1/	Production harvested 1/ 2/		Tonnage originated by Class I railways 3/		
	Quantity	Quantity	Percentage of total production	Quantity	Percentage of total production	Percentage of harvested production
	1,000 melons 4/	Short tons 5/	1,000 melons 4/	Short tons 5/	Percent	Short tons 6/	Percent	Percent
1928	38,000	513,000	38,000	513,000	100	370,240	72	72
1929	42,668	576,018	42,668	576,018	100	413,522	72	72
1930	52,990	715,365	47,313	638,726	89	464,947	65	73
1931	40,774	550,449	40,774	550,449	100	393,027	71	71
1932	26,929	363,542	23,604	318,654	88	214,295	59	67
1933	23,405	315,968	23,405	315,968	100	208,760	66	66
1934	21,804	294,354	21,682	292,707	99	167,689	57	57
1935	32,731	441,868	30,074	405,999	92	240,982	55	59

1/ Florida, Alabama, Georgia, Mississippi, North Carolina, and South Carolina.

2/ Total production less quantities not harvested because of market conditions.

3/ Southern Region.

4/ Estimates of Crop Reporting Board, United States Department of Agriculture.

5/ Preceding column divided by 13.5 (assumed number of tons per 1,000 melons).

6/ Interstate Commerce Commission: Freight commodity statistics.

Table 29.-Watermelons and other farm products: Seasonal average farm price per 100 pounds, Alabama, 1928-35

Product	1928	1929	1930	1931	1932	1933	1934	1935
	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.
Tobacco	---	---	---	---	---	---	---	---
Cotton	18.04	16.55	9.06	5.64	6.83	10.60	12.10	10.70
Strawberries	10.56	6.67	8.61	8.06	4.17	2.64	3.89	5.83
Hogs	7.60	8.10	7.90	6.10	3.75	3.25	3.70	6.90
Calves	7.90	8.50	6.20	4.60	3.55	3.35	3.65	4.50
Cattle	5.80	6.20	5.50	3.50	2.65	2.40	2.45	3.30
Sheep	7.50	6.20	5.10	3.70	2.55	2.50	2.85	3.25
Tomatoes	---	---	---	---	---	---	---	---
Cantaloups	---	---	---	---	---	---	---	---
Peaches(48 lbs.)	2.29	2.71	2.50	1.35	1.77	1.67	1.56	1.77
Potatoes	2.15	2.57	2.42	1.15	1.40	1.13	1.37	1.17
Cabbage	3.13	1.00	2.25	.70	2.42	1.25	.25	.75
Hay (loose)	.74	.74	.76	.46	.35	.46	.58	.52
Watermelons	.56	.34	.39	.28	.19	.32	.20	.21

Table 30.-Watermelons and other farm products: Seasonal average farm price per 100 pounds, Florida, 1928-35

Product	1928	1929	1930	1931	1932	1933	1934	1935
	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.
Tobacco	29.40	32.20	27.40	15.30	25.30	16.10	30.40	27.60
Cotton	17.60	17.01	9.68	5.49	6.30	9.33	12.24	10.34
Strawberries	23.33	14.72	18.61	15.97	13.53	8.33	11.67	11.94
Hogs	7.10	7.70	7.50	5.50	3.35	3.20	3.85	6.50
Calves	8.00	9.60	8.50	7.30	5.10	4.70	5.10	6.10
Cattle	6.50	6.60	5.20	4.00	3.20	3.10	3.50	4.60
Sheep	7.60	6.30	5.90	4.20	3.15	3.00	3.30	3.95
Tomatoes	6.68	5.66	7.15	3.53	4.81	3.53	5.36	4.68
Cantaloups	3.33	3.33	2.92	2.50	1.67	1.67	2.17	2.50
Peaches (48 lbs.)	2.81	3.54	2.50	1.98	1.98	1.88	1.56	1.98
Potatoes	3.62	2.98	2.85	1.80	1.82	1.67	1.90	2.25
Cabbage	1.84	1.68	3.16	1.12	1.60	.80	.80	2.80
Hay (loose)	.97	.88	.86	.59	.45	.53	.65	.56
Watermelons	1.11	1.03	.93	.74	.59	.74	.69	.41

Table 31.- Watermelons and other farm products:-Seasonal average farm price per 100 pounds, Georgia, 1928-35

Products	1928	1929	1930	1931	1932	1933	1934	1935
	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.
Tobacco	13.20	18.70	10.30	6.70	11.30	11.40	19.10	18.90
Cotton	18.22	16.64	9.55	5.83	6.98	10.13	12.12	11.07
Strawberries	8.06	8.06	7.22	7.36	5.22	2.78	5.28	8.33
Hogs	8.00	8.50	8.00	5.70	3.65	3.20	4.15	6.90
Calves	7.70	8.10	7.50	5.80	4.05	3.75	3.70	4.80
Cattle	6.50	6.60	5.40	3.80	2.75	2.55	2.65	3.45
Sheep	7.20	6.50	5.90	4.20	3.10	3.25	3.20	3.85
Tomatoes	3.32	4.34	2.64	1.89	1.51	1.13	2.83	3.21
Cantaloupes	2.50	3.70	1.33	1.25	.83	1.33	1.67	1.83
Peaches	1.88	2.40	2.40	1.15	1.98	1.56	1.67	1.77
Potatoes	2.63	2.32	2.25	1.25	1.22	1.60	1.60	1.25
Cabbage	1.53	1.00	1.75	.75	2.60	1.20	.50	1.90
Hay (loose)	.82	.80	.79	.52	.39	.56	.68	.57
Watermelons	.52	.56	.26	.24	.19	.27	.30	.19

Table 32.- Watermelons and other farm products: Seasonal average farm price per 100 pounds, Mississippi, 1928-35.

Product	1928	1929	1930	1931	1932	1933	1934	1935
	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls.	Dolls
Tobacco	---	---	---	---	---	---	---	---
Cotton	18.31	17.05	9.78	6.16	6.82	10.51	12.50	11.32
Strawberries	11.94	9.31	7.36	7.64	5.19	2.92	4.44	6.67
Hogs	7.60	8.00	7.90	6.20	3.85	3.15	4.70	6.90
Calves	8.10	8.50	5.80	4.50	3.45	3.15	3.35	4.60
Cattle	5.60	6.00	4.40	3.10	2.35	2.10	2.25	3.35
Sheep	6.20	6.00	5.00	4.00	2.60	3.00	2.75	3.25
Tomatoes	3.30	3.96	2.45	2.02	3.49	3.36	1.23	2.08
Cantaloupes	---	---	---	---	---	---	---	---
Peaches (48 lbs)	3.02	3.12	3.02	1.56	1.98	2.08	1.56	1.98
Potatoes	2.58	2.55	2.38	1.23	1.20	1.52	1.27	1.50
Cabbage	2.28	1.06	1.85	.68	2.50	1.62	.30	1.12
Hay (loose)	.68	.69	.70	.40	.36	.46	.54	.52
Watermelons	.56	.60	.63	.39	.56	.46	.30	.35

Table 33.- Watermelons and other farm products: Seasonal average farm price per 100 pounds, North Carolina, 1928-35

Product	1928	1929	1930	1931	1932	1933	1934	1935
	Dollars	Dollars	Dollars	Dollars	Dollars	Dollars	Dollars	Dollars
Tobacco	19.00	18.50	12.90	8.80	12.20	16.00	28.50	20.30
Cotton	18.49	16.63	9.55	5.97	7.12	10.80	12.31	11.49
Strawberries	8.06	8.61	8.06	7.36	5.00	4.92	6.25	6.11
Hogs	9.90	10.10	9.70	7.50	4.80	4.35	5.70	8.80
Calves	10.60	10.90	9.60	7.20	5.50	4.55	5.00	6.20
Cattle	7.60	7.80	7.00	5.10	4.00	3.45	3.80	4.80
Sheep	8.30	7.90	6.60	4.60	3.65	3.40	3.60	4.35
Tomatoes	---	3.77	3.77	1.42	1.89	1.89	2.26	2.64
Cantaloups	1.63	2.00	1.92	1.17	1.00	1.33	.92	1.33
Peaches (48 lbs.)	2.40	2.92	2.81	1.35	1.98	1.77	2.08	1.98
Potatoes	.93	1.78	2.13	.93	1.13	1.45	1.02	1.17
Cabbage	2.70	1.00	2.20	.70	1.50	1.30	.50	1.30
Hay (loose)	.89	.88	.90	.66	.57	.71	.86	.72
Watermelons	.50	.65	.43	.30	.26	.15	.26	.44

Table 34.- Watermelons and other farm products: Seasonal average farm price per 100 pounds, South Carolina, 1928-35

Product	1928	1929	1930	1931	1932	1933	1934	1935
	Dollars	Dollars	Dollars	Dollars	Dollars	Dollars	Dollars	Dollars
Tobacco	12.70	15.50	12.00	9.20	11.30	12.60	21.60	18.80
Cotton	18.35	16.77	9.65	6.05	7.21	10.74	12.35	11.31
Strawberries	8.06	9.31	8.06	7.36	5.72	4.78	5.56	8.33
Hogs	9.00	9.10	9.00	6.70	4.25	3.95	5.10	7.80
Calves	8.30	8.90	7.90	6.30	4.70	4.15	4.30	5.10
Cattle	6.50	6.80	6.20	4.70	3.40	3.25	3.35	4.15
Sheep	7.80	7.30	6.70	5.40	3.55	3.60	3.40	4.15
Tomatoes	3.53	4.68	3.77	2.64	1.51	3.77	3.21	3.77
Cantaloups	2.18	3.17	1.25	.92	.83	.75	1.00	.83
Peaches (48 lbs.)	2.29	2.81	2.81	1.46	1.98	1.77	1.67	1.77
Potatoes	.90	2.18	2.13	1.13	1.47	1.50	1.40	1.25
Cabbage	2.44	1.74	2.05	1.16	1.57	1.07	1.20	2.20
Hay	.86	.88	.89	.61	.50	.61	.83	.64
Watermelons	.35	.65	.19	.36	.22	.19	.44	.34

NEW YORK PRICE OF WATERMELONS RELATED TO HARVESTED PRODUCTION, AND TO INDUSTRIAL PRODUCTION, 1924-36

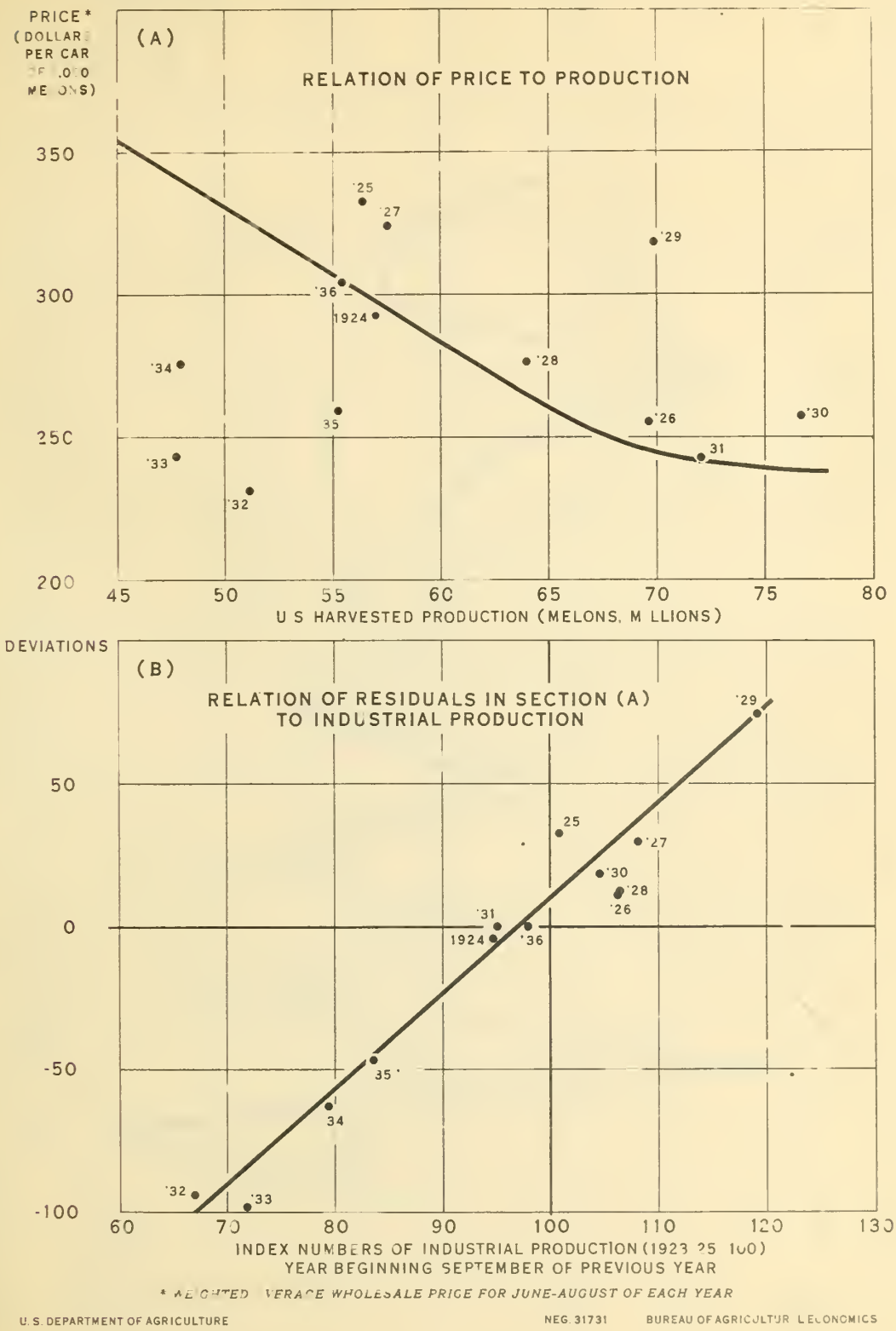

FIGURE 1

WATERMELONS: ACREAGE CHANGES AND AVERAGE PRICE RECEIVED BY GROWERS THE PREVIOUS YEAR, 1921 TO DATE

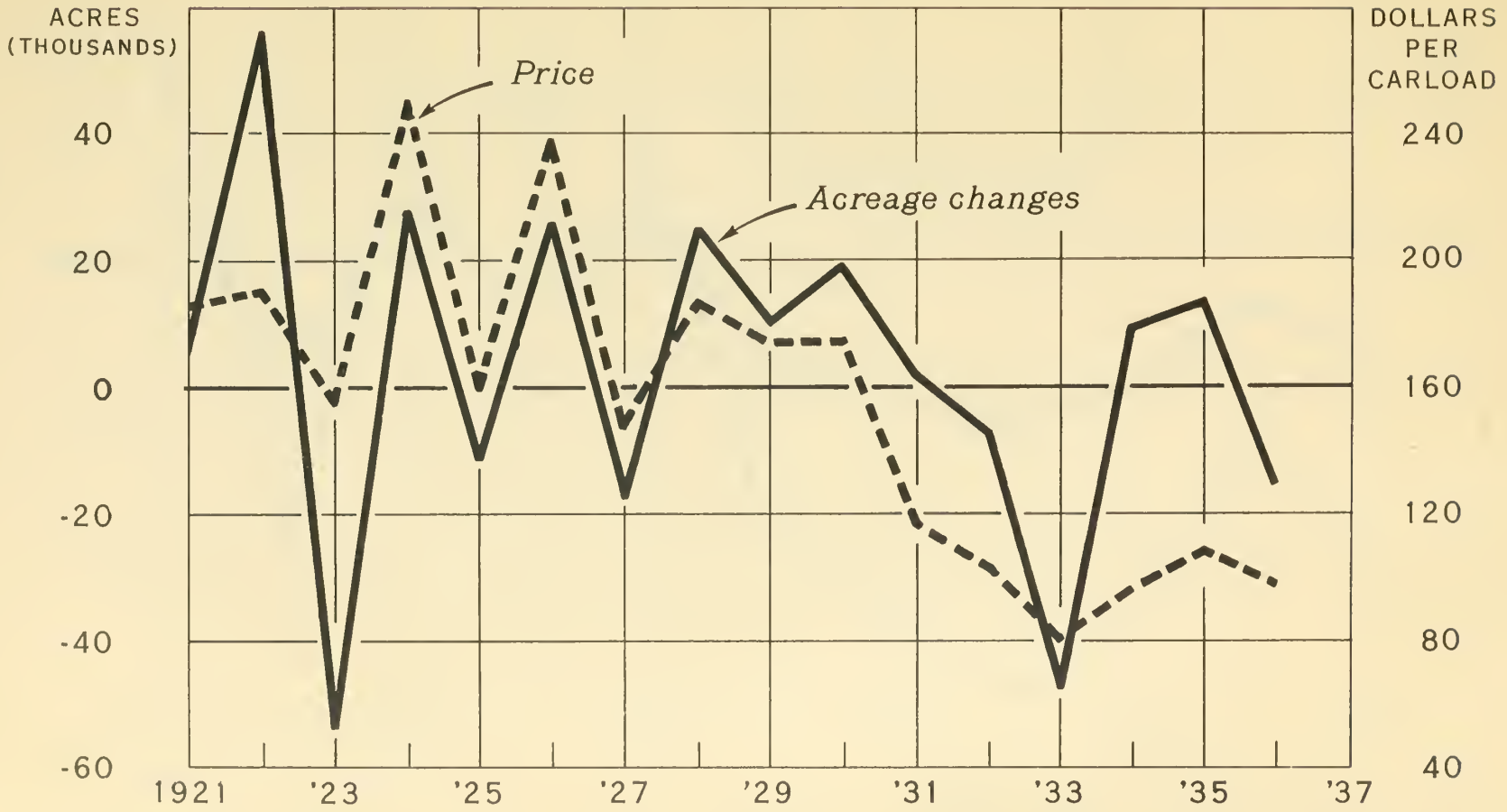

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FIGURE 2

WATERMELONS: PRICE AT NEW YORK, AND SAME PRICE MINUS FREIGHT RATE FROM MOULTRIE, 1925-35

INDEX NUMBERS (1925-29=100)

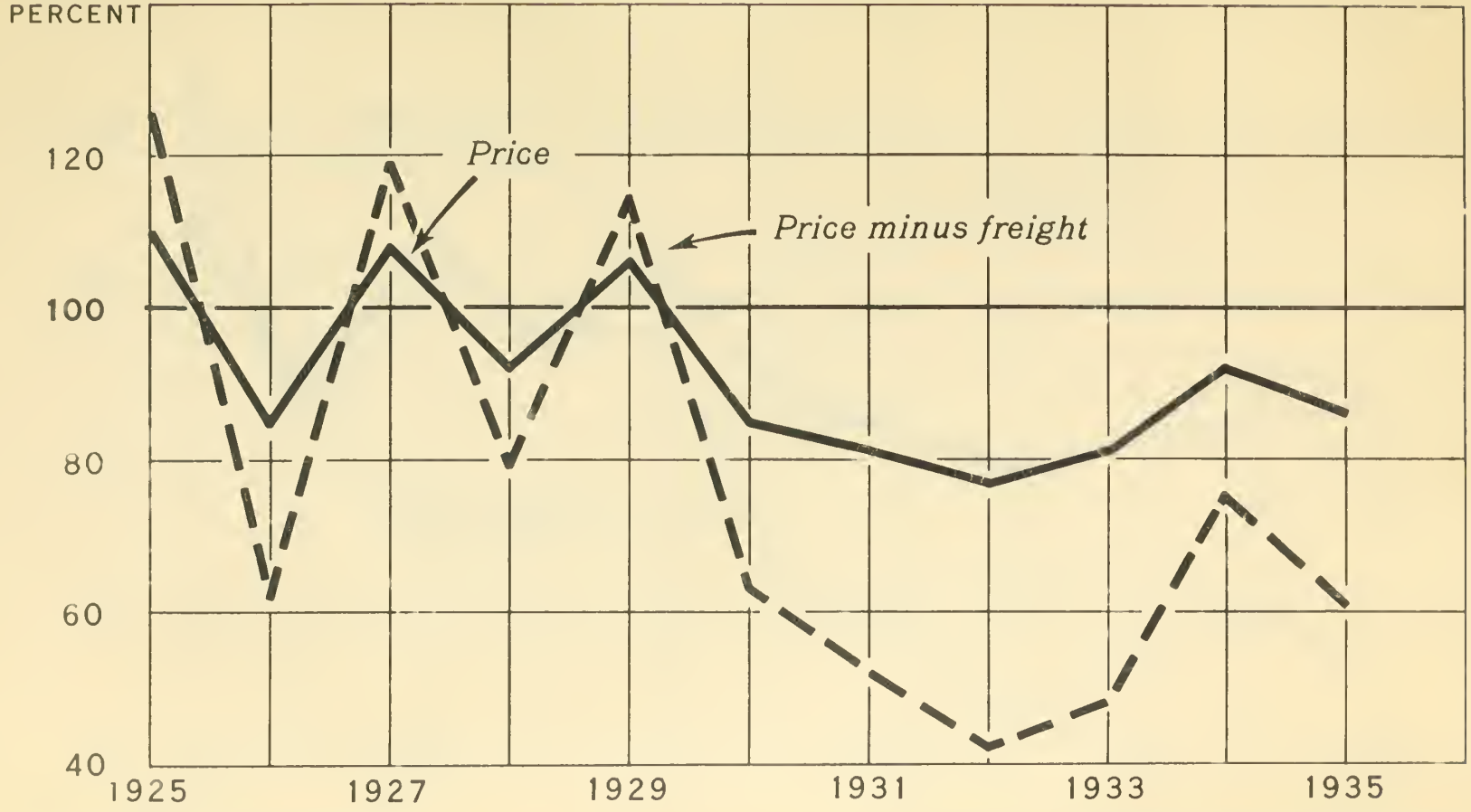

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FIGURE 3.- THE FREIGHT RATE FROM MOULTRIE TO NEW YORK HAS BEEN RELATIVELY CONSTANT. AS MARKET PRICES DECLINED FREIGHT CHARGES ABSORBED A LARGER PORTION OF THE PROCEEDS FROM THE SALE OF A CARLOAD OF WATERMELONS FROM MOULTRIE AT NEW YORK AT THE AVERAGE NEW YORK PRICE. THE AMOUNT AVAILABLE TO COVER EXPENSES OF PRODUCTION AND MARKETING OTHER THAN TRANSPORTATION HAS, THEREFORE, DECLINED RELATIVELY MORE THAN THE MARKET PRICE.

WATERMELONS: CITY PRICES AND FARM PRICE, 1925-35

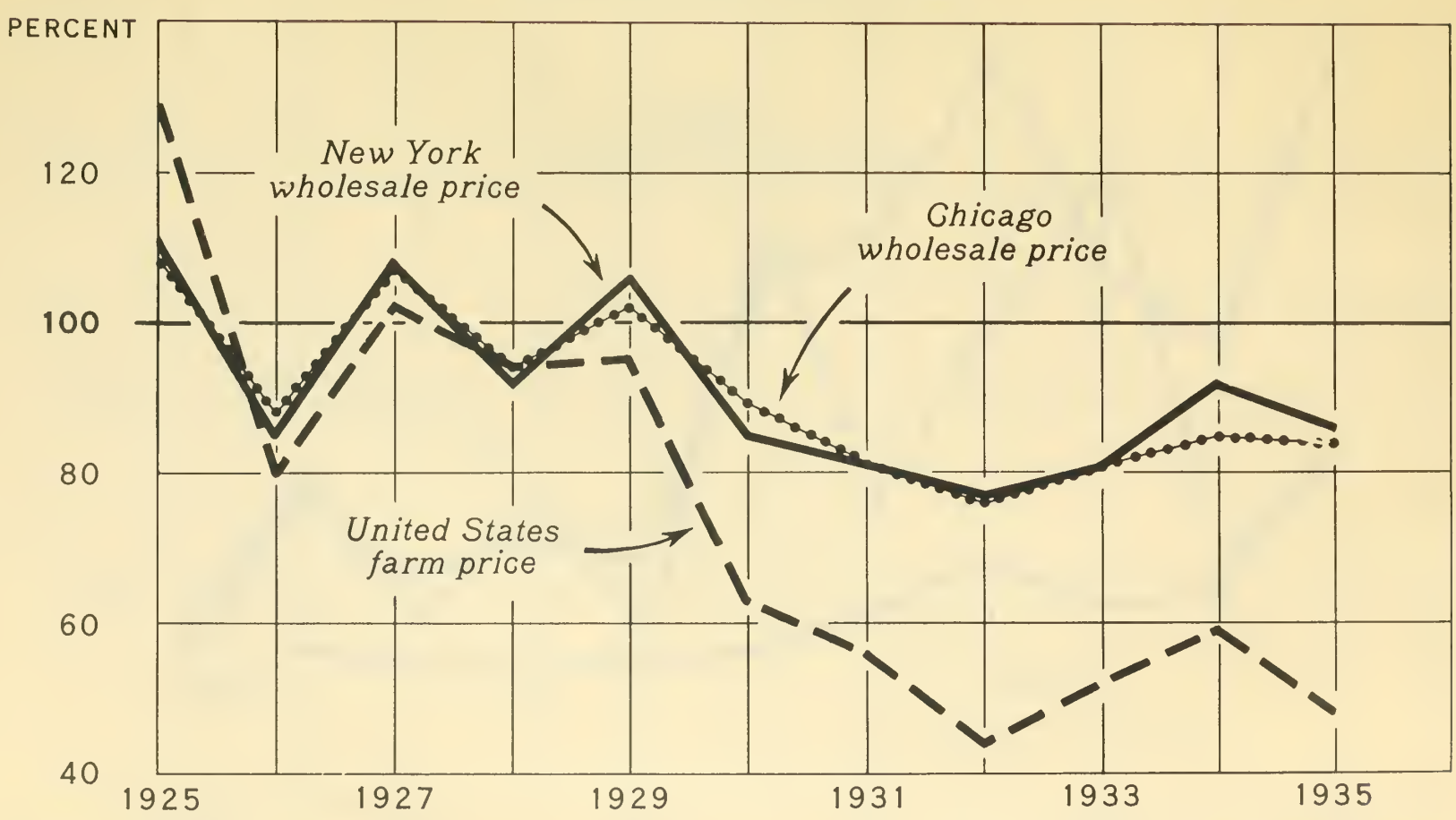

FIGURE 4.- THE DECLINE IN THE FARM PRICES OF WATERMELONS DURING THE DEPRESSION HAS BEEN PROPORTIONATELY GREATER THAN THE DECLINE IN THE PRICE AT NEW YORK AND CHICAGO. FAILURE OF FREIGHT RATES TO DECLINE IN PROPORTION TO CITY PRICES IS PART OF THE EXPLANATION.

WATERMELONS: FREIGHT RATES TO NEW YORK, FROM SOUTHERN STATES, AS PERCENTAGES OF STATE FARM PRICES, 1925-35

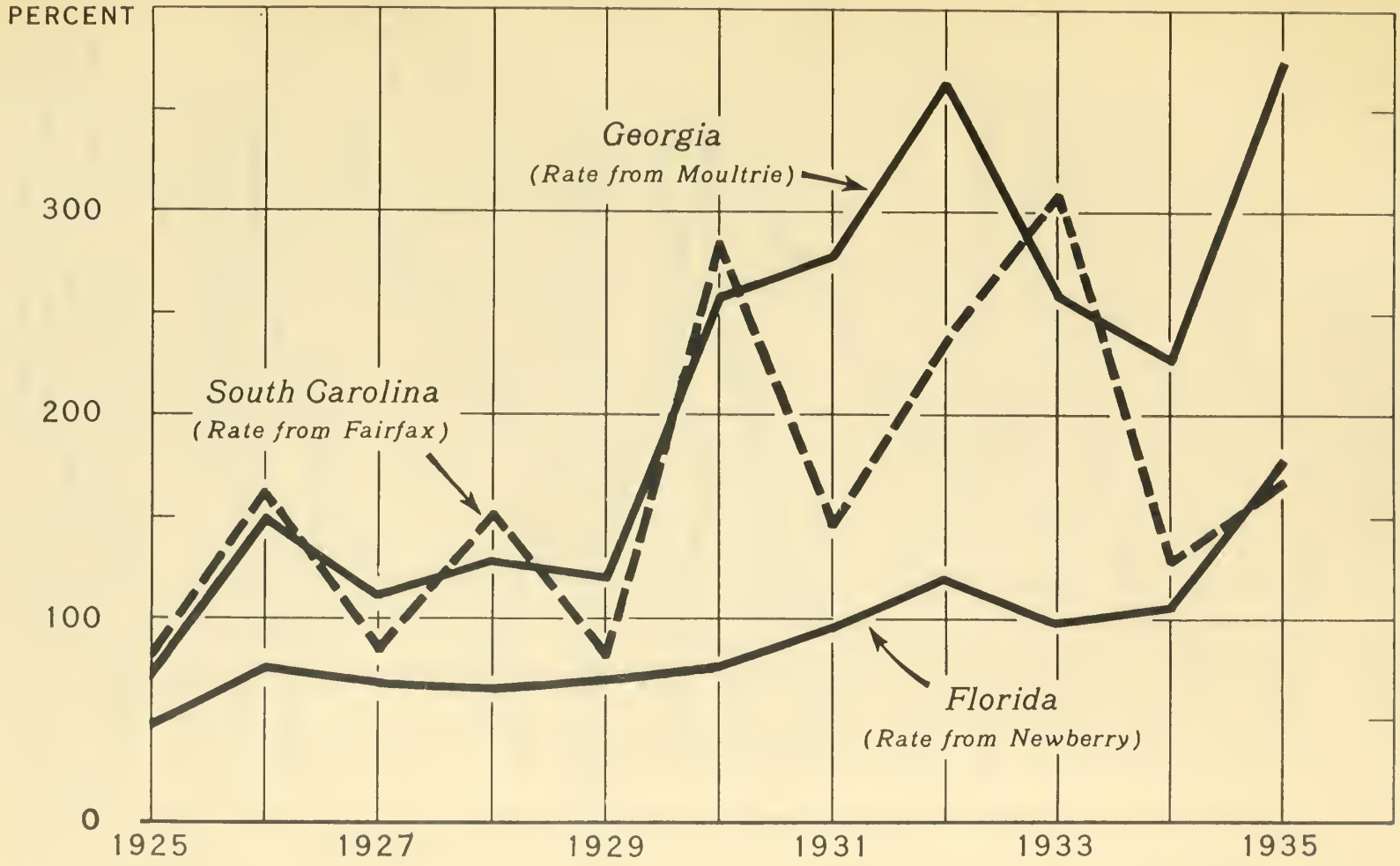

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FIGURE 5.- AS A RESULT OF THE DECLINE IN PRICES AND THE COMPARATIVE FIXITY OF FREIGHT RATES, THE LATTER HAVE BECOME MUCH HIGHER RELATIVELY TO FARM PRICES DURING THE DEPRESSION. IN RECENT YEARS THE RAILROADS, FOR TRANSPORTING WATERMELONS FROM GEORGIA AND SOUTH CAROLINA TO NEW YORK, HAVE SOMETIMES RECEIVED TWICE OR THREE TIMES AS MUCH AS FARMERS IN THOSE STATES HAVE RECEIVED FOR PRODUCING THEM.

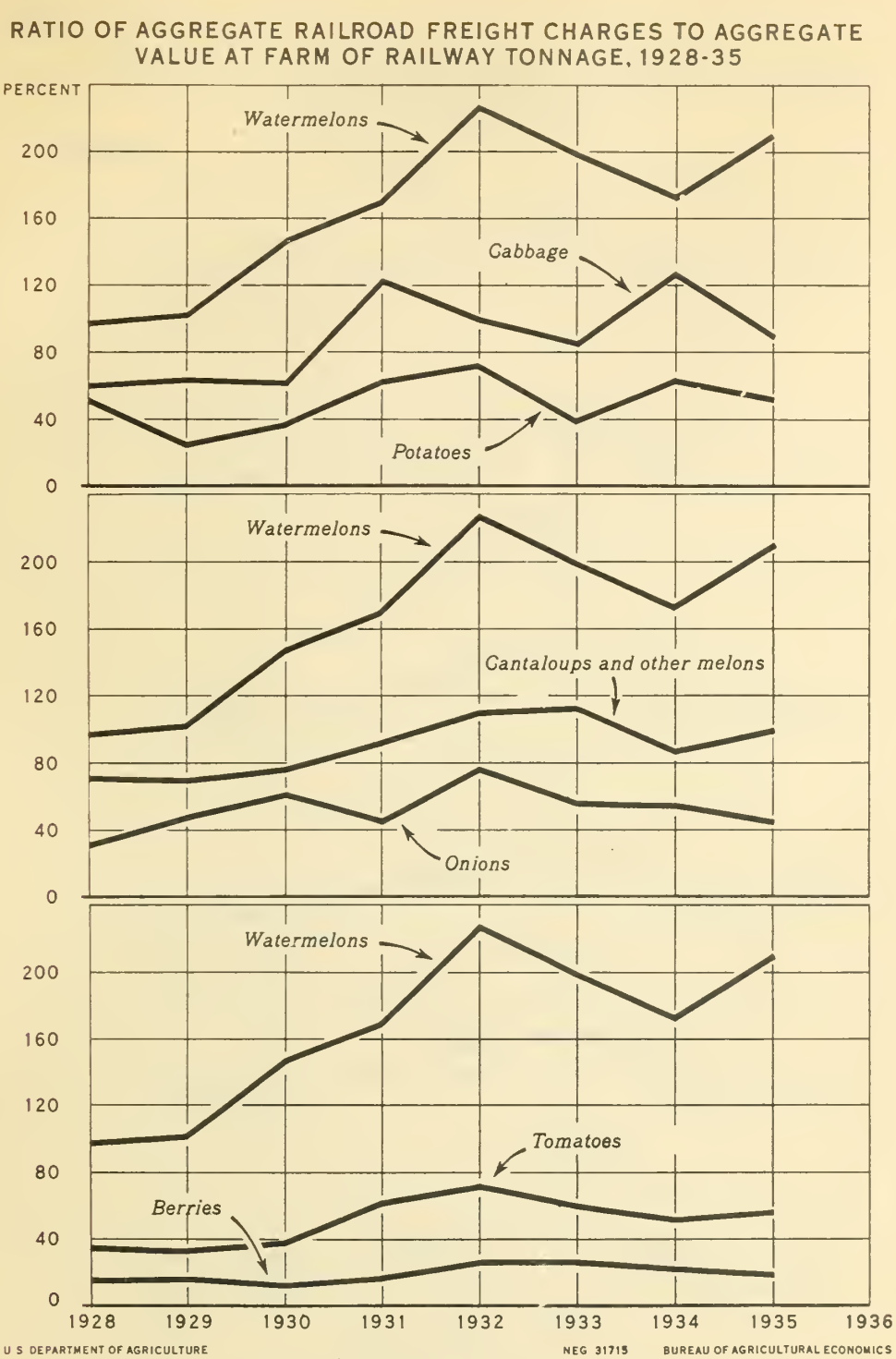

FIGURE 6.- THE AGGREGATE REVENUES COLLECTED BY THE RAILROADS ARE HIGHER, IN PROPORTION TO THE AGGREGATE VALUES AT THE FARM OF THE TONNAGE HANDLED BY THEM, ON WATERMELONS THAN ON CABBAGE, POTATOES, CANTALOUPS AND OTHER MELONS, ONIONS, TOMATOES, AND BERRIES. THE DISPARITY HAS INCREASED DURING THE DEPRESSION.

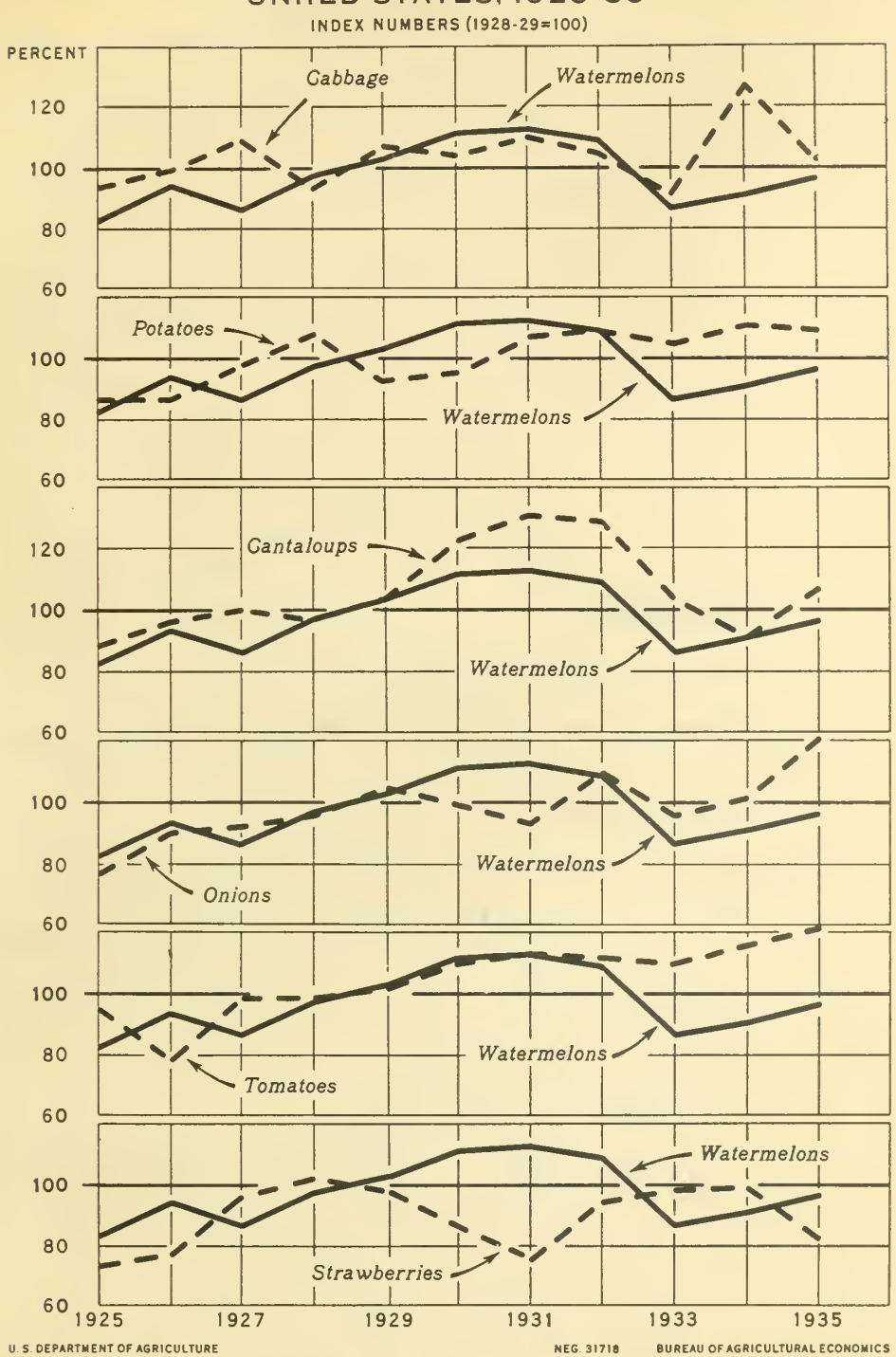

FIGURE 7.- DURING RECENT YEARS THE ACREAGE OF WATERMELONS HAS SHOWN SOME TENDENCY TO DECLINE RELATIVELY TO THAT OF CABBAGE, POTATOES, CANTALOUPS, ONIONS, AND TOMATOES, ALTHOUGH NOT RELATIVELY TO THAT OF STRAWBERRIES.

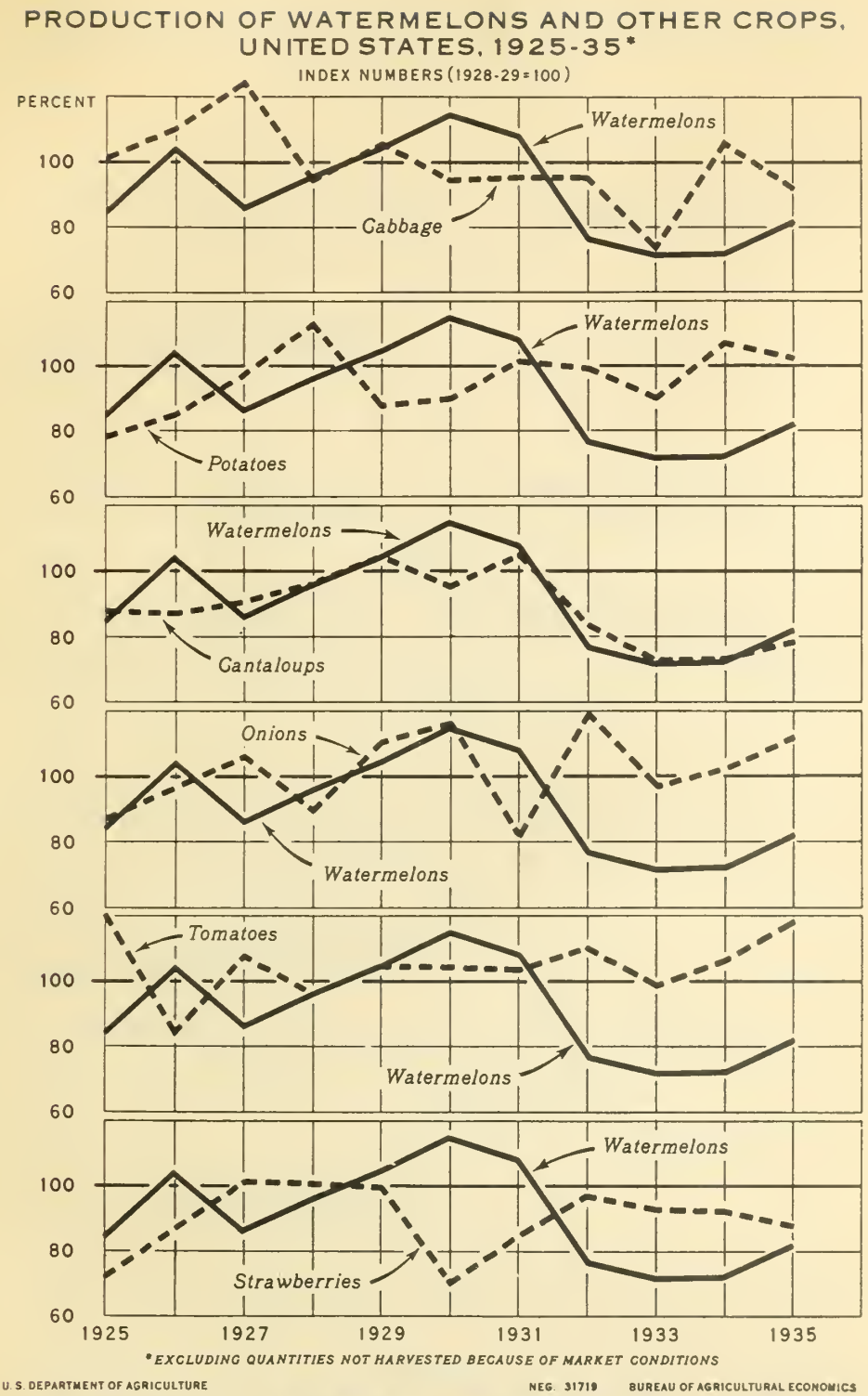

FIGURE 8.- THE HARVESTED PRODUCTION OF WATERMELONS HAS DECLINED DURING RECENT YEARS RELATIVELY TO THAT OF CABBAGE, POTATOES, ONIONS, TOMATOES, AND STRAWBERRIES, ALTHOUGH NOT RELATIVELY TO THAT OF CANTALOUPS.

WATERMELONS: PRODUCTION AND RAILROAD TRAFFIC, 1928-35

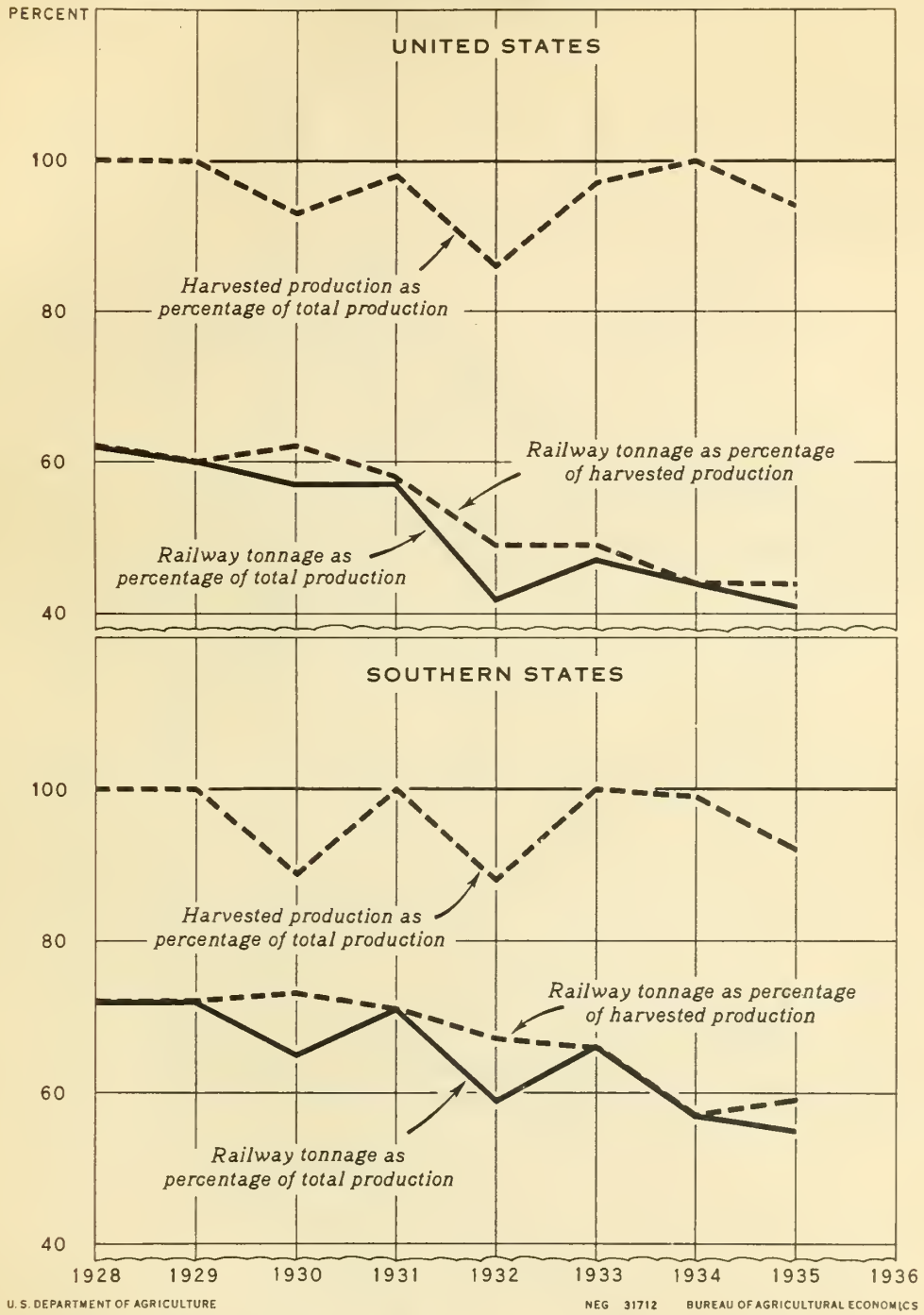

FIGURE 9.- THE PERCENTAGE OF THE TOTAL PRODUCTION OF WATERMELONS HANDLED BY THE RAILROADS HAS BEEN DECLINING. THE DECLINE IS ACCOUNTED FOR IN PART BY ABANDONMENT OF WATERMELONS BECAUSE OF MARKET CONDITIONS IN SOME YEARS. THE REMAINDER OF THE DECLINE MUST BE ACCOUNTED FOR BY A RELATIVE INCREASE IN LOCAL CONSUMPTION OR IN TRUCK AND WATER TRANSPORT.

SEASON AVERAGE FARM PRICES OF FARM PRODUCTS, GEORGIA, 1928-35

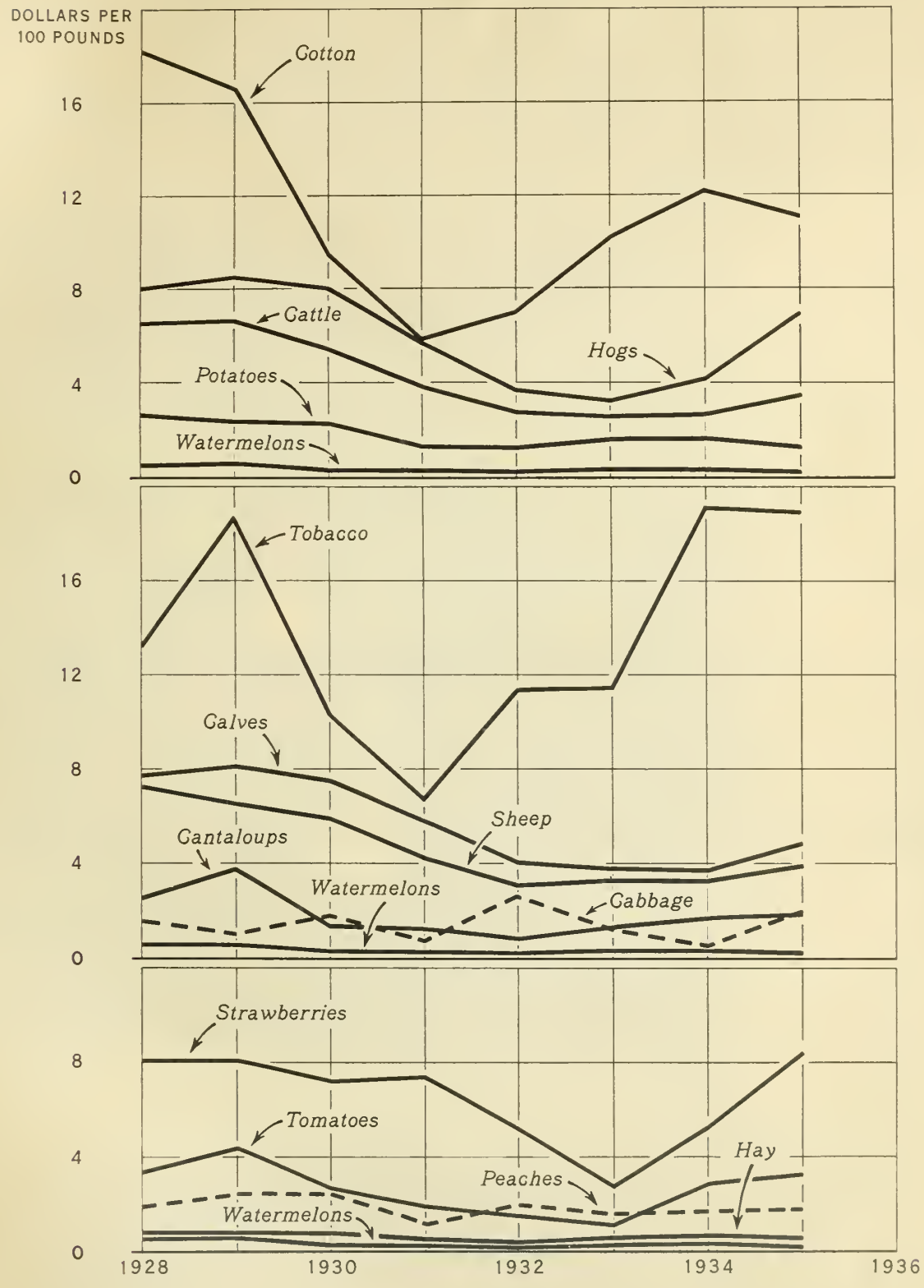

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FIGURE 10